Toward a Harmonized Solution?

- Results of the IEA Standby Power Initiative and
- Recommendations by the authors

The IEA Standby Power Initiative

- To facilitate international discussion and co-operation on standby power issues, the IEA organised three workshops stating in 1999
- The workshops explored the benefits of international collaboration to encourage national efforts.
- The workshops indicated the importance of coordination of efforts internationally to facilitate participation by industry, and the risk of the proliferation of national and regional initiatives on regulating standby power use.

The IEA Standby Power Initiative

- the IEA initiative did not generate a joint solution for the most common standby-power-consuming devices (battery chargers).
- However, one very important result of the IEA workshops is that standby power will soon be included in energy test protocols and energy-efficiency policies for all products that consume significant standby power.
- The International Electrotechnical Commission (IEC) TC59, created, an *ad hoc* working group to examine test procedures for standby power on appliances and electrical equipment

The IEA Standby Power Initiative

- The global nature of the standby equipment market will be best served by co-ordinated efforts among industry and governments.
- Internationally co-ordinated efforts would reduce the burden on manufacturers of globally marketed products, encouraging support for greater reductions in standby power consumption.
- An international approach would eliminate the confusion created by redundant energy-efficiency labels in different countries. A uniform international policy could simplify the process of educating and informing consumers and stimulate greater demand for energy-efficient products and appliances.

Recommendations

- **Develop guidelines for lowering standby power use in appliances not currently covered by any program.**
  - Many of the newest technologies will use some standby power. To avoid having "networked homes" that are also “high-standby-consumption homes,” it is important to identify new appliances that will consume standby power and develop guidelines for lowering standby power use in these appliances as well as those that are not currently covered by any program.

Recommendations

- **Avoid the proliferation of different labels to reduce standby power.**
  - Some regions or countries have introduced their own labels or schemes to encourage the purchase of equipment with low standby power consumption. It would be important to, at a minimum, ensure that the criteria among them are consistent. To this end, it is recommended that the consumption levels specified in the EU Code of Conduct for External Power Supplies be used by all labeling schemes and public procurement and efficiency standards programs.

Recommendations

- **Address the specific case of digital TVs.**
  - Television broadcasting is rapidly moving toward digital technology; as a result, STBs and adaptors will likely soon be responsible for significant new standby power demand in most economies. Countries should coordinate efforts, especially communication and power management protocols, to ensure that the standby power mode of the new generation of STBs is as energy efficient as possible.

Recommendations

- **Include standby power information on existing appliance energy labels.**
  - Appliance energy labels are used in most OECD countries. Most of these labels do not indicate how much energy is consumed while the appliance is on standby. For some appliances, such as electric ovens in some countries, the annual standby consumption is as high as the on-mode consumption. Forthcoming updates of appliance energy labels should include an indication of standby power consumption.

Recommendations

- **Stimulate research on new low-standby technologies.**
  - New solutions to reduce standby power should be encouraged. Research and development activities should be stimulated at all levels, especially to help manufacturers.
- **Establish an international network of accreditation organisations**.
  - An international network of accreditation organisations should be set up to reduce the costs to manufacturers of qualifying products with low standby consumption under multiple different regional programs.

Conclusions

- Energy-efficient solutions are already available to substantially reduce standby power use. Tackling the problem from an international platform is the most effective way to increase global penetration of these technologies.
- The IEA's standby power initiative has demonstrated to policy makers worldwide that energy efficiency can significantly reduce energy waste. This initiative is a model for future international collaborations to reduce energy use and improve the environment.
- Prompt implementation in both developed and developing countries of the recommendations of this paper will significantly advance efforts to reduce standby power consumption.